

2012 Scheme

Q.P.Code: 207015

Reg. No.:.....

**Second Year BASLP Degree Supplementary Examinations
March 2020
Statistics and Research Methods & Epidemiology in Speech and
Hearing**

Time : 3 hrs

Max marks : 80

- *Answer all questions to the point neatly and legibly • Do not leave any blank pages between answers • Indicate the question number correctly for the answer in the margin space*
- *Answer all parts of a single question together • Leave sufficient space between answers*

Essay:

(4x10=40)

1. Explain the various measures of central tendency. What are the requisites of a good measure of central tendency.
2. Explain the properties of normal distribution. The scores obtained by students in a test are normally distributed with mean 400 and standard deviation 100. What percentage of students receive scores between 300 and 500. Given $P(0 < Z < 1) = 0.3413$
3. Define correlation and discuss various types of correlation with the help of scatter diagram. Calculate Spearman's rank correlation for the following data:

| | | | | | | | | |
|---------------------------|----|----|----|----|----|----|----|----|
| Marks in audiology | 82 | 55 | 60 | 36 | 80 | 25 | 90 | 35 |
| Marks in speech pathology | 72 | 26 | 34 | 28 | 50 | 24 | 68 | 44 |

4. Explain briefly about the incidence and prevalence of hearing loss in adults and geriatrics.

Short notes

(5x5=25)

5. Probability sampling methods
6. Scales of measurement
7. Group designs
8. Measures of dispersion
9. Need for epidemiological studies

Answer briefly

(5x3=15)

10. Students t-test
11. Sampling error and non-sampling error
12. Region of acceptance and region of rejection
13. Skewness and kurtosis
14. Simple random sampling
